

3-31-1995

# Resiliency in Children: Identifying and Nurturing Coping Skills Through Outpatient Mental Health Services

Sharon Michel  
*Augsburg College*

Follow this and additional works at: <https://idun.augsburg.edu/etd>



Part of the [Social Work Commons](#)

---

## Recommended Citation

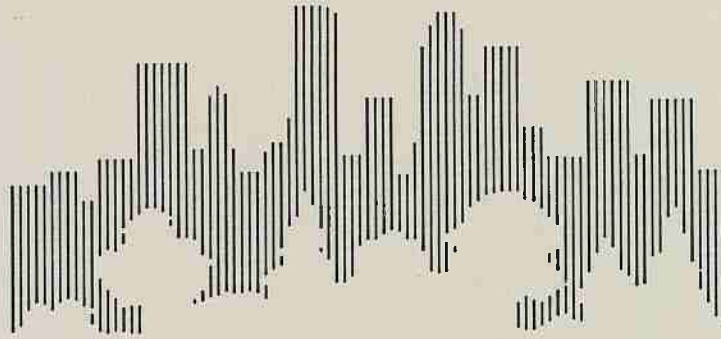
Michel, Sharon, "Resiliency in Children: Identifying and Nurturing Coping Skills Through Outpatient Mental Health Services" (1995). *Theses and Graduate Projects*. 259.  
<https://idun.augsburg.edu/etd/259>

This Open Access Thesis is brought to you for free and open access by Idun. It has been accepted for inclusion in Theses and Graduate Projects by an authorized administrator of Idun. For more information, please contact [bloomber@augsbu.edu](mailto:bloomber@augsbu.edu).

---

# AUGSBURG

---



---

C • O • L • L • E • G • E

---

## MASTERS IN SOCIAL WORK THESIS

Sharon Michel

Resiliency in Children: Identifying and Nurturing Coping  
Mechanisms Through Outpatient Mental Health Services

MSW  
Thesis

Thesis  
Michel

1995

**Resiliency in Children: Identifying and Nurturing Coping  
Skills Through Outpatient Mental Health Services**

**M.S.W. Thesis**

**by**

**Sharon L. Michel**

**A Thesis Submitted to the Graduate Faculty  
of Augsburg College  
in Partial Fulfillment of the Requirements  
for the Degree of  
Master of Social Work**

**March 31, 1995**

**MASTER OF SOCIAL WORK  
AUGSBURG COLLEGE  
MINNEAPOLIS, MINNESOTA**

***CERTIFICATE OF APPROVAL***

This is to certify that the Master's thesis of

**Sharon Lynn Michel**

has been approved by the Examining Committee for the thesis requirements for the Master of Social Work Degree:

Date of Oral Presentation: April 5, 1995

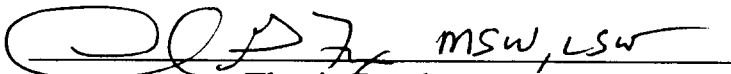
**THESIS COMMITTEE:**



\_\_\_\_\_  
Thesis Advisor



\_\_\_\_\_  
Thesis Reader



\_\_\_\_\_  
Thesis Reader

## **ACKNOWLEDGMENTS**

I would like to thank many individuals who have helped through the thesis process all of whom made the journey less threatening and more fun.

To Tony Bibus for making research less forboding and having the special gift of endless encouragement and support.

To Carol Keuchler for allowing me the opportunity to vent my frustrations while being professional enough to keep me responsible for the thesis process.

To my fellow classmates, especially Dawn, who have given me much support and friendship.

To Steve Gordon for his help, humor, and standard of excellence. And to Deb Gordon for believing in me and encouraging me to pursue this goal.

To the staff at the Mental Health Center of North Iowa who gave constant guidance and help. The clients of this agency are also to be thanked for allowing me to learn from their experiences.

To Dave Fox for being a mentor and excellent supervisor. Your patience and understanding will always be remembered.

To my parents who have always supported me more than they realize.

To my children, Lindsay and Doug, who have been so patient for two long years. I hope I was able to model diligence for you.

Finally, thank you Bob, for your computer savvy, and for giving me the freedom to follow my bliss. You're the best -- in so many ways!

**THANK YOU ALL!**

Shari Michel  
April 28, 1995

## **ABSTRACT OF THESIS**

### **Resiliency in Children: Identifying and Nurturing Coping Skills Through Outpatient Mental Health Services**

**By**

**Sharon L. Michel**

**March 31, 1995**

Resiliency is the ability to adapt successfully despite living in adverse conditions. It involves negotiation between risk and protective factors. Researchers have found that resiliency is not necessarily constant but rather contextual. Therefore, characteristics of resiliency, once identified, can be nurtured and to some extent taught. This research study attempts to identify characteristics of resiliency in children who are brought to an outpatient mental health center for behavioral difficulties and assess whether treatment services nurture such characteristics. Problem and competence scales were collected from the parents about their children at intake and again for this study. A comparison was made of the scores to determine any change in competence and behavior. Data analysis was limited by the small sample size; however, findings did yield a small change in competence scales and the greatest change in aggressive behavior. Increased knowledge about variables that serve to protect against adversity can be used to tailor intervention models in mental health treatment of children.

## **TABLE OF CONTENTS**

<b>Chapter I. Introduction</b> .....	<b>1</b>
Conceptual Framework .....	4
<b>Chapter II. Literature Review</b> .....	<b>7</b>
Risk Factors .....	10
Environmental Risk Factors .....	10
Familial Risk Factors .....	11
Biological Risk Factors .....	12
Poor Outcome .....	12
Protective Factors .....	15
Personality Variables .....	15
Family Variables .....	17
Social Support .....	18
Resiliency .....	20
<b>Chapter III. Research Rationale</b> .....	<b>22</b>
Research Question .....	23
Operational Definitions .....	23

<b>Chapter IV. Methodology</b> .....	<b>24</b>
Sample Selection .....	25
Administrative Design .....	26
Research Design .....	26
<b>Chapter V. Data Analysis</b> .....	<b>30</b>
Findings .....	33
<b>Chapter VI. Discussion</b> .....	<b>46</b>
Implications .....	49
<b>Chapter VII. Limitations</b> .....	<b>51</b>
<b>Chapter VIII. Conclusions</b> .....	<b>55</b>
<b>References</b> .....	<b>57</b>
<b>Appendix A</b> .....	<b>62</b>
<b>Appendix B</b> .....	<b>66</b>



This study identifies factors that may help children adjust to stress and its effects on behavior. Through understanding what variables promote healthy adaptation, social workers can tailor interventions that nurture existing coping skills and foster new skills.

The journey from birth to adulthood is a critical phase of the life cycle. For children these years can be wrought with risks that hinder healthy growth and development. Social workers and other child welfare professionals have a vested interest in the effects of harsh life conditions and what service interventions serve to neutralize adversities and encourage adaptation.

Adverse biological and environmental influences can jeopardize successful growth and development. For example, biological risk factors include birth defects, chronic illness, low-birth weight, exposure to chemical toxins and prenatal drug or alcohol abuse (Wright & Masten, in press). Environmental, or psychosocial risk factors pose a similar threat. These adversities include war, poverty, homelessness, overcrowded living conditions, violence, malnutrition, and familial stressors such as mentally ill or chemically dependent parents, divorce, adolescent mothers, neglect, abuse, and foster care placement (Green, 1991; Masten, 1991; Rolf, Masten, Cicchetti, Nuechterlein, & Weintraub, 1990; Rutter, 1987; Werner & Smith, 1982; Wright & Masten, in press). Many of these adversities coexist. Such multiple stressors increase the probability of poor outcome for these children (Cowen & Work, 1988; Wright & Masten,

in press). Pellegrini (1990) observes that the effects of multiple risk factors are "multiplicative rather than simply additive" (p. 203).

Prolonged adversities have subsequent consequences on the cognitive, social, and educational development and performance of children (Garmezy & Masten, 1990; Luthar & Zigler, 1990). These consequences often manifest pathologically in impaired cognitive and affective functioning, attention deficits, disturbed social relationships, delinquency, and psychological maladjustment such as depression and anxiety (Hauser, Yieyra, Jacobson, & Wertlieb, 1985; Luthar & Zigler, 1990; Pellegrini, 1990).

Although social scientists have historically studied the pathology of maladaptation, they have begun to look at those individuals who, despite adverse life conditions, achieve successful growth and development absent of any debilitating consequences. These individuals have been identified by researchers as "resilient" (Garmezy & Masten, 1986; Masten, 1994; Masten, Best, & Garmezy, 1990; Osborn, 1990; Rutter 1987; Werner & Smith, 1982).

Children who adjust despite tremendous odds are resilient however, it should be noted that each individual has a threshold of stress beyond which pathological symptoms will develop.

A major contributor to the historical foundation of resiliency research is the work of Emmy Werner and Ruth Smith (1982). These women began a research endeavor in the 1950's to identify resilient children and identify variables that influence the ability to overcome adversity. This study set

the stage for future research focusing on strengths rather than pathology of adaptation.

It has only been in the past twenty years, however, that other researchers have designed research to study this phenomenon (Cowen & Work, 1988; Mrazek & Mrazek, 1987). Michael Rutter (1985, 1987), a British psychiatrist, and Norman Garmezy and Ann Masten, researchers of developmental psychopathology at the University of Minnesota, are other prominent researchers who have done much work over that past fifteen years studying the process of resiliency in children.

## **CONCEPTUAL FRAMEWORK**

The study of resiliency is tied to the field of developmental psychopathology (Garmezy & Masten, 1986; Masten, 1994; Masten, Morison, Pellegrini, & Tellegen, 1990). Developmental psychopathology is the study of risk, stress, coping and protective factors that influence the development of competent or maladaptive behaviors (Garmezy & Masten, 1986; Masten, et al., 1990; Wright & Masten, in press). It looks at the biochemical, genetic, cognitive, affective and social development of humans in relation to developmental tasks (Achenbach, 1990; Garmezy & Masten, 1986). Both the study of developmental psychopathology and resiliency focus on variations of adaptation within a developmental perspective (Masten, 1994). Adaptation is judged by an individual's successful attainment of developmental milestones. Similarly, resiliency is characterized by good adaptation despite developmental risks due to acute stressors or chronic adversities.

Good psychosocial adaptation is viewed as competence whereas the presence of pathological symptoms indicates poor adaptation (Masten, 1994). Resiliency involves an equilibrium between an individual's protective mechanisms in response to encountered stressors or risk factors. The process of resiliency therefore, is dynamic throughout childhood development.

The implication of such findings is significant in that it offers insight that protective competencies can be nurtured and taught through

interventions. Understanding adaptive processes and identifying vulnerability factors that influence susceptibility to stress serve to identify children who are at high risk for subsequent disorders and deepen the theoretical understanding of healthy and unhealthy development (O'Grady & Metz, 1987.) In turn, this information provides professionals the building blocks for preventive intervention strategies (Beardslee, 1989; Cowen, et. al, 1990; Cowen & Work, 1988; Masten, 1994; Masten, et al., 1990; Rutter, 1985). Resiliency research can offer policy makers and clinicians insight into the combination of individual characteristics and environmental factors that are apparent components of the resiliency process and, hence, avenues of prospective intervention.

Understanding children's coping skills is a "crucial task for professionals concerned with children's health and development" (Wertlieb, et al., 1987, p. 557). Provision of services that enhance an individual's adaptive abilities can be strategic interventions during critical developmental phases and life turning points (Pelligrini, 1990). Such an approach is a fresh alternative to mental health's disproportional emphasis on pathology (Cowen & Work, 1988; Werner, 1984). Garmezy and Masten (1986) encourage an alliance between mental health clinicians and researchers in furthering an understanding of resiliency. In this complementary endeavor, the clinician can offer observations and intervention critiques. Reciprocally, the researcher can apply this information to further research and offer practitioners findings to modify

clinical interventions. The focus of this thesis is an example of this joint approach to research and service delivery.

Observations of treatment methods practiced with child consumers at an outpatient mental center prompted inquiry of the efficacy of symptom management in contrast to fostering coping skills. Encouraged by curiosity about resilient individuals, this student considered the application of resiliency research to a medical model setting.

Are the characteristics associated with resiliency present in children who are brought in for mental health services? Are clinicians identifying these strengths as treatment avenues in addition to symptom management? Additionally, in this setting, often the symptomatic child is the identified patient although familial or environmental factors are placing the child at risk for maladaptation. How can the clinician then, provide the child resources and skills to buffer such risk factors? Does the family or community have resources to tap into as well?

If mental health clinicians are able to identify characteristics of resiliency in the children they are working with and nurture such skills, they are in effect treating the presenting symptoms of stress as well as doing critical prevention work by fostering coping skills. Research that assesses children's vulnerability to risk attempts to isolate key mechanisms of coping and map the interactions between risk and protective factors.

## **LITERATURE REVIEW**

Early "risk" research began with the investigation of genetic risk to children of schizophrenic mothers (Pellegrini, 1990; Watt, Anthony, Wynne, & Rolf, 1984). With the observation of successful adaptation by some children despite risk, research interest shifted to confirm resiliency in other populations. For example, the ability to adapt despite adversity was confirmed by research on infants with perinatal complications and adolescents at risk for delinquency (Pellegrini, 1990; Gilfix, 1992). The task for researchers then became identifying what conditions present risks to healthy adaptation and what variables and traits contribute to resilient outcomes.

Risk factors that pose a threat to individual adaptation include impaired social and intellectual skills, biochemical defects, and psychological markers. Environmental factors include demographic variables, familial and cultural characteristics, and social contexts.

It is generally accepted that exposure to adverse conditions results in children experiencing deficiencies in social, emotional, intellectual, and behavioral skills (Garmezy et al., 1984; Hauser, et al., 1985; Luthar & Ziglar, 1991; Pellegrini, 1991; Wright & Masten, in press). Children who, despite risk factors show favorable outcomes in development are labeled as "resilient". In an attempt to understand these children various research studies have been done.

Longitudinal studies are most appropriate to gain insight into what variables impact successful outcomes of development from childhood to adult status. A longitudinal design allows monitoring risk and protective variables throughout development. It is surprising, then, to find that very few longitudinal studies have been completed in the research of resiliency (Block & Block, 1980; Garmezy & Masten, 1986; Miller & Jang, 1977; Murphy & Moriarty, 1976; Werner & Smith, 1982; White, Kaban, & Attanuci, 1979).

Of these few studies, the work of Emmy Werner and Ruth Smith (1982) is the most influential, and serves as a reference for other resiliency research. In their study, the authors followed a cohort of children born on Kauai in 1955. The study sample began with 698 infants and periodically assessed these individuals for qualities of vulnerability and resiliency. The principal goals of the study were, 1) to document the course of the pregnancies and their outcomes through the child's adulthood, and 2) to assess the long-term effects of perinatal complications on the individual's cognitive, physical and psychosocial development.

Methods of inquiry involved personal interviews with and observations of expectant mothers. Once the children reached school age they were tested for aptitude, achievement, and personality characteristics. Review of any case files from other social agencies was an additional research method. Interviews with the subjects during adulthood to assess their current status in retrospect completed the study.



The findings demonstrated that children from uncomplicated pregnancies, who were good-natured infants and confident toddlers experienced less vulnerability to life stresses. This was also true for school age children who reported good peer relations, having many interests, and a positive concept of self. Additional factors that foster resiliency were fewer number of siblings, and the presence of a nurturing parent, substitute parents, or emotional support outside of the family. Werner and Smith (1982) have utilized 30 years of cumulative research to gain insight into the variables that influence resiliency and maladaptation.

Project Competence, a research program of the University of Minnesota conducted by Norman Garmezy and Ann Masten, was an exploratory, quasi-experimental study whose goal was to analyze relationships among indicators of competence, stress measures, and familial and relationship patterns that are potential modifiers of stress and competence in a community sample of 3rd-6th graders (Garmezy & Masten, 1986).

Methodology included teacher ratings of behavior, work habits and academic achievement, peer assessment, parental interviews, and clinical ratings by the interviewer. Measurement tools were both quantitative and qualitative. Instruments included the Devereux Elementary School Behavior Rating Scale to measure classroom behavior, the Child Behavior Checklist, Class Play technique for peer assessment, and the Life Events Questionnaire used to identify stressful life events.

Project Competence findings identified that competence is hindered by low IQ and socio-economic status. Classroom disruptiveness also increases with the presence of these two variables. Conclusions were drawn that show a relationship between background characteristics, life stressors, and decreased competence.

Out of this these studies and other influential research has come identifiable variables that serve as risk and protective factors in the process of resiliency. Subsequently, these findings have been supported by other research.

## RISK FACTORS

A risk factor is a characteristic of a group of people that increases the probability of negative outcomes (Garmezy & Masten, 1986, 1990; Masten, 1994; Masten, et al., 1990; Wright & Masten, in press). These characteristics are environmental, familial, and biological.

### Environmental Risk Factors

War and terrorism are two severe environmental stressors that influence an individual's development and adaptation. Community violence, chronic poverty and homelessness also increase probability of poor developmental outcome (Werner & Smith, 1982; Wright & Masten, in

press). Neglect, physical and sexual abuse are environmental risk factors that often result in affective and behavioral disorders (Wright & Masten, in press).

### Familial Risk Factors

Familial risk factors include parental psychopathology such as schizophrenia, affective disorders, or depression, for example. These mental health conditions can compromise effective parenting (Pellegrini, 1990; Wright & Masten, in press; Werner & Smith 1982). Similarly, instability within the household is shown to have adverse effects on adaptation (Pellegrini, 1990; Wright & Masten, in press ). Examples of instability within the family unit include multiple separations between parents, divorce, hospitalizations, frequent conflict amongst family members, transient lifestyle patterns, and economic hardship.

Teen parenting is also shown to place children at risk for maladaptation (Wright & Masten, in press). The effects of childbearing and child rearing, decreased education and employment opportunities, constraints on the mother's independence and identity serve as risk factors that place both the mother's and infant's developmental tasks in jeopardy. The risk of foster care placement is also greater with teen mothers increasing the possibility of poor outcome for the child (Masten, 1994).

### Biological Risk Factors

Biological risk factors include prenatal and perinatal trauma, genetic predisposition to mental illness, and congenital abnormalities (Pellegrini, 1990; Wright & Masten, in press; Werner & Smith, 1982). Additionally, premature birth and low birth weight increase medical vulnerability (Wright & Masten, in press). Cowen & Work (1988) and Garnezy and Masten (1990) found that injury, acute illness and chronic medical conditions restrict developmental success. Wright and Masten (in press) explain how prenatal drug and alcohol exposure is also shown to increase vulnerability through pregnancy complications, neonatal addiction and consequent withdrawal. These authors also explain how maternal substance abuse is additionally associated with other contributors to negative outcome such as poor nutrition and lack of prenatal care.

### Poor Outcome

Prolonged exposure to risk factors can result in impaired psychological and social functioning (Cowen & Work, 1988; Garnezy & Masten, 1990; Pellegrini, 1990). For example, children who experience severe illness or death in the family often experience shyness, withdrawal and anxiety while young children having difficulty coping with parental divorce are

shown to be aggressive and behaviorally impaired (Cowen & Work, 1988). Garmezy and Masten (1990) note that poor developmental adjustment due to risk factors can manifest behaviorally in the form of "conduct disorder in younger children, delinquency in adolescence, and antisocial personality in adulthood" (Garmezy & Masten, 1990, p. 80). The absence of psychopathology and presence of healthy psychological and behavioral adaptation led researchers to search for variables that counteract risk factors.

### **Risk Factors**

Children living in poverty

Children with chronic illness or handicap

Pregnant teens

Abused and neglected children

Children of divorce

Children in foster care

Children of chemically dependent parents

Children who abuse alcohol and drugs

Drug-exposed infants

Children exposed to environmental hazards

Absence of prenatal care

Low birth weight infants

Children without health care

Homeless children

(Green, 1991).

## PROTECTIVE FACTORS

"Protective factors are the positive counterparts to risk factors" (Pellegrini, 1990, p. 204). Protective factors mediate the effects of risk. They are mechanisms, processes, or qualities within the individual or environment that reduce the threat of poor outcomes.

Protective factors may not require the presence of stress to have an effect (Rutter, 1985) nor are they necessarily a positive or pleasurable occurrence (Rutter, 1985). Additionally, a protective factor may not be an experience at all but rather a quality such as gender (Garmezy & Masten, 1986; Rutter, 1990; Werner, 1989). Protective factors take the form of dispositional personality variables, positive family atmosphere, and availability and utilization of social supports (Garmezy & Masten, 1990). When protective factors buffer or neutralize risk factors, resiliency occurs. Resiliency research has identified some consistent indicators of coping mechanisms.

### Personality Variables

Werner and Smith (1982) found infants with an affectionate disposition and pleasant temperament fared better than their counterparts. Temperament as a protective mechanism was also found to carry over

into childhood (Cowen, et al., 1990; Wright & Masten, in press). Additionally, children with an adequate self-esteem, internal locus of control, sense of autonomy, and good communication skills experienced resiliency despite risk (Beardslee & Ponderfsky, 1988; Garmezy, 1991; Green, 1991; Kaufman, Gruneaum, Cohler, & Gamer, 1979; Luthar, 1991; Mrazek & Mrazek, 1986; Werner, 1984; Werner & Smith 1982; Wright & Masten, in press). A personal attribute of at least average intelligence and adequate school performance is also found in the literature as a protective factor (Beardslee & Ponderfsky, 1988; Garmezy & Masten, 1991; Green, 1991; Masten, 1994).

Generally supported throughout the literature as an essential protective mechanism in resilient children is a sense of self-efficacy, self-worth, and hopefulness (Green, 1991; Masten, 1994; Neighbors, Forehand, & McVicar, 1993; Rutter, 1987). Possessing a talent or skill valued by another promotes feelings of personal accomplishment and achievement and serves as a protective factors (Green, 1991; Masten, 1994; Wright & Masten, in press). Werner (1984) and Kaufman (1979) discovered that having a hobby or interest outside the home provided the opportunity for feelings of accomplishment and purpose, hence serving as a mediator of risk. Rutter (1987) also found task accomplishment as a correlate to resiliency. Both academic and recreational responsibilities served this purpose.

An interesting variable indicating resiliency addressed by Beardslee and Ponderfsky (1988), Masten et al. (1990), Mrazek and Mrazek (1987),



and Pellegrini (1990) is the phenomenon of "required helpfulness". These authors found that children who had household chores or caregiving duties were more resilient in stressful situations. These responsibilities gave the children a sense of purpose.

Relationships between resilient outcomes and personality characteristics highlighted by Block and Block (1980) and Murphy and Moriarty (1976) include a sense of autonomy, empathy, task-orientation, problem solving skills, and good peer relationships.

Finally, Wright and Masten (in press) and Werner (1984) note that individuals with a religious faith, sense of humor, and good fortune are found to have a greater likelihood to experience resiliency as opposed to maladaptation.

### Family Variables

Garmezy and Masten found in their work with Project Competence (1986) that a warm, loving relationship with one parent and the absence of criticism serve as a protective mechanism, fostering resiliency. Similarly, Masten (1994) notes that effective parenting promotes resiliency. In addition, shared parental values and morals, a strong interest in the child, and open communication in the home show a relationship with resilient outcomes (Block & Block, 1980; Murphy & Moriarty, 1976).

Werner and Smith (1982), Werner (1984), and Neighbors, et al. (1993) point out the beneficial effects of a close bond between child and caregiver. A relationship such as this fosters the formation of trust, critical to healthy growth and development.

### Social Support

The strongest correlation of resiliency throughout the literature is a positive relationship with one parent or another adult outside the home (Beardslee, 1989; Cowen, et al., 1990; Garmezy, 1990, 1991; Green, 1991; Kauffman, et al., 1979; Masten, et al., 1990; Mrazek & Mrazek, 1987; Rutter, 1991). Additionally, social support systems within the community are shown to serve an ameliorative role (Garmezy, 1983; Rutter, 1979; Werner & Smith, 1982). These authors, supported by the work of Emmy Werner (1984), point out that resilient youths appear to form relationships with adult mentors such as ministers and teachers for informal support and resilient role models. Werner (1984) also found that a network of support from extended family, classmates, friends and neighbors increases a child's ability to be resilient in the presence of adversity. Such relations can promote feelings of being loved which, in turn, serve to protect a child from risk (Mrazek & Mrazek, 1987; Rutter, 1987).

### **Protective Factors**

A supportive social network

Good intellectual skills

Good health and physical fitness

Adaptable temperament

High self esteem

Self efficacy, internal locus of control

Strong sense of competence based on achievements, successes, special talents

Ability to persist in achieving goals

Ability to seek environments conducive to personal growth

Having close, trusting relationships

Religious faith

Good fortune, good luck

Attractiveness and appeal to adults

Humor

Effective parenting

Parents allow age-appropriate autonomy

Parents available at time of failure or distress

Presence of a positive value system

Socioeconomic advantage

Mentors and positive role models

Belonging to and participating in a group one values

Opportunities to learn and master new skills and challenges

(Warner & Smith, 1982; Wright & Masten, in press).

## RESILIENCY

There is an erroneous tendency to view "resiliency" as a personality trait when, rather, it is a process of adaptation involving personal characteristics and skills interacting with life circumstances (Mrazek & Mrazek, 1987; Pellegrini, 1990; Rutter, 1987; Werner, 1984). Within developmental psychopathology literature it is accepted that both biological and environmental influences interact and combine in the development of internal (psychological) and external (behavioral) adaptation (Masten, 1994; Masten, et al., 1990; O'Grady & Metz, 1987; Werner, 1984).

"Resiliency refers to a pattern over time, characterized by good eventual adaptation despite developmental risk, acute stressors or chronic adversities" Masten, 1994, p. 4). Resiliency is contextual within the negotiation of risk and protective factors and varies over time (Garmezy & Masten, 1986; Green 1991; Masten, et al., 1990; Mrazek & Mrazek, 1987; Rutter, 1985, 1987).

Definitions of resiliency throughout the literature reflect this dynamic component. Werner and Smith (1982) describe resiliency as the capacity of an individual to effectively cope with internal/external stresses and vulnerabilities. The absence of emotional or developmental problems indicates the presence of resiliency as well (O'Grady & Metz, 1990). Cowen, et al. (1990) refer to resiliency as "wholesome adjustment"

(p. 198). Similarly, "successful adaptation" is chosen to define resiliency by other authors (Beardslee, 1989; Rutter, 1987; Werner, 1989; Zunz, Turner, & Norman, 1993).

Individuals possess a self-righting tendency (Werner & Smith, 1982). The positive effect of protective factors therefore, is shown to have more influence on an individual's adaptation than negative risk factors, although no individual is invulnerable to stress (Masten, et al., 1990; Werner, 1989). The implication of these findings and the understanding of protective factors as modifiers of risk that contribute to individual adaptation are of clinical importance. Professionals concerned with the healthy development of children can find rationale for intervention strategies within the resiliency research literature. Clinicians who are knowledgeable about risk and protective factors will be prepared to identify children who are at risk for maladaptation, identify existing protective factors within the child, environment and family, and nurture those mechanisms to foster positive outcomes. It is this type of social work and mental health intervention that this research study hopes to provide more information about.

## **RESEARCH RATIONALE**

Mental health providers are often charged with the task of managing or reversing children's psychological and behavioral manifestation of stress. Unfortunately, clinicians are often limited in their treatment approach to focusing on the pathology of the presenting problem. It is acknowledged that while crisis intervention is needed, changes at the core of the individual and environmental influences are more likely to result in long-term success. The strengths perspective has slowly influenced clinicians to look for existing skills that can be capitalized on to negotiate adverse conditions. Although many psychotherapy treatment methods favor such skill development, brief treatment at an outpatient clinic pushes clinicians to operate in the medical model of symptom management.

This research study is an attempt to identify protective mechanisms that influence resiliency in child consumers. Additionally, assessment of whether treatment intervention nurtures coping skills while also addressing presenting problem symptoms is attempted.

The potential for extended treatment efficacy is increased when mental health clinicians guide clients in developing coping skills. Such interventions can provide stress-protective conditions, skill development such as anger control, problems solving, and communication, and can enhance self-esteem, all of which favor healthy adaptation (Cowen & Work, 1988). If clinicians are able to identify characteristics of resiliency in the children they are working with and nurture these skills, they are in

effect treating the presenting symptoms of stress as well as doing critical prevention work.

### **RESEARCH QUESTION**

Based on parental perception, has there been any change in characteristics of resiliency in children served by the Mental Health Center of North Iowa?

### **OPERATIONAL DEFINITIONS**

**Resiliency** - successful adaptation despite risk demonstrated by effective coping and the absence of psychological or behavioral problems.

**Risk Factor** - Biological and environmental characteristics that are associated with an elevated probability of undesired outcome.

**Protective Factor** - Individual and environmental characteristics that serve as moderators of risk that enhance good outcome.

**Outpatient Mental Health Intervention** - Supportive, behavioral, and cognitive psychotherapy for individuals who visit the agency.

## **METHODOLOGY**

### **Setting**

The Mental Health Center of North Iowa (MHCNI) is a private non-profit, outpatient mental health center located in Mason City, Iowa. The agency serves nine counties: Cerro Gordo, Floyd, Worth, Wright, Kossuth, Mitchell, Winnebago, Hancock, and Franklin. The Center's professional staff includes four psychiatrists, five clinical psychologists, eleven licensed clinical social workers, two psychiatric nurses, and clerical support personnel. Community Support Programs are available in Wright, Cerro Gordo, Franklin, and Kossuth counties. These centers provide resources and support for chronically mentally ill, part of which includes Drop-In and in Cerro Gordo, a day treatment component. These sites are under the center's administration.

Outpatient mental health services offered by the MHCNI include psychological testing and assessment, individual, family, marital, and group psychotherapy, psychotropic drug management, and community support services. Professional staff offer most services at satellite locations in the various counties. In-home, emergency and after hour services are also provided on a case by case basis.

Clients served by the MHCNI are of a wide socio-economic range. Many are of low-income or below poverty level. Poverty is a common stressor experienced by the client base. The center offers a sliding fee



scale and never refuses services to anyone for inability to pay. Other adversities confronted by the client population include domestic violence, substance abuse, lack of support systems, homelessness, chronic mental illness, physical, emotional and sexual abuse. Consumers are referred by other professionals or self-referred. The diverse range of clientele and presenting problems offered a broad sample population for this research.

### **Sample Selection**

Many of the MHCNI consumers are children. The adversities experienced by the client base place these children at serious risk for maladaptation. Children are often referred to the MHCNI for psychological testing for poor adaptation to multiple stressors. For example, children are referred with presenting problems such as depression, withdrawal, poor peer relationships, school and behavioral problems. Parents and parent surrogates are an "important source of data about children's competencies and problems" (Achenbach, 1991, p. 2; Cowen, et al., 1990). Thomas Achenbach's Child Behavior Checklist (CBCL) is one of many psychological testing instruments used to assess a child's current status and identify appropriate treatment interventions.

Children between the ages of 4 and 16 who have received a psychological evaluation within the past 2 1/2 years were identified. This initial sample frame yielded 370 individuals. From that base a selective

sample was drawn of individuals who received the CBCL as part of their initial evaluation, narrowing the sample size to 62 children.

### **Administrative Design**

Prior to initiation of this study, approval was given by the Internal Review Committee of the MHCNI. Additional approval was granted by the Institutional Review Board of Augsburg College. The principal investigator was also available throughout the research endeavor to answer questions or explain the project to MHCNI staff.

### **Research Design**

This exploratory research is an attempt to assess the presence of resiliency among children at risk for maladaptation and if outpatient mental services foster protective mechanisms. The design uses both qualitative and quantitative measures. Parents who have completed a CBCL (Appendix A) as part of their child's initial psychological evaluation were asked to complete another CBCL after treatment intervention. Competency indicators and behavioral problems were compared between the two CBCLs. It was postulated that a second assessment yielding an

increase in competency and decreased behavioral problems might indicate clinical intervention fostering resiliency.

The CBCL assesses a child's social competencies and behavioral problems as perceived by his or her parent or parent surrogate. The CBCL has been used in other resiliency research studies as a measurement instrument for risk outcomes (behavioral problems) and protective factors (Garmezy & Masten, 1986; O'Grady & Metz, 1987; Wertlieb, et al., 1987).

The CBCL as a measurement instrument was applicable for this study for many reasons. For example, the CBCL is an established assessment instrument at the MHCNI and one the sample population was familiar with. Additionally, it can be self-administered, takes minimal time to complete (approximately 15 minutes), and is written for a 5th grade reading level.

Part I of this instrument identifies competencies of a child. These competence indicators are identified as protective factors in the resiliency literature. For example, participation in extracurricular activities, hobbies, and clubs serve to mediate risk factors. A strong mentor relationship is often associated with this type of community involvement also (Werner, 1984). The protective factors of "required helpfulness" and a sense of responsibility are determined in question IV. Peer, sibling, and parent/child relationship are also measured. Finally, academic competence is determined which also serves as a protective mechanism (Rutter, 1987).

Assessing a child's behavioral functioning is an essential step in determining resiliency (Beardslee, 1989; Garmezy & Devine, 1984). Effective coping is evidenced by the absence of behavioral problems and psychopathology; poor outcomes are indicated by psychological and behavioral problems (Hauser, et al., 1985; Luthar & Ziglar, 1990; Osborn, 1990).

Part II of the CBCL measures numerous child behaviors and psychological concerns of parents. The behaviors scored are categorized into internal (psychological) and external (acting out) pathology. Additionally, it assesses for the presence of some medical conditions that serve as risk factors.

Rationale for use of the CBCL in this study also lies in its psychometric properties. Content validity, for example, has been supported by significant discrimination between demographically matched referred children and the normative population (Achenbach, 1991). Additionally, construct validity is supported by associations with the Conners (1973) Parent Questionnaire and the Quay-Peterson (1983) Revised Behavior Problem Checklist (Achenbach, 1991). The reliability property of the CBCL is also soundly established (Achenbach, 1991). Permission to use the CBCL was obtained from the author, Thomas M. Achenbach.

In an effort to be sensitive to the parents or guardian of the selective sample, the principal investigator's supervisor, Chief Clinical Social Worker for the MHCNI, co-authored the recruitment letter. This letter

explained the purpose of the research and requested voluntary participation and consent. It was mailed with the CBCL, additional open-ended question, a copy of a the recruitment letter and consent for their records, and a stamped return envelope. Three days after the initial mailing a follow-up letter was sent requesting reconsideration for participation. Voluntary participants who returned a signed consent form, completed CBCL and additional question within 14 days provided the sample upon which research was conducted.

Qualitative and quantitative profiles were computed on Parts I and II respectively. Scores were plotted on the profile scoring sheet to compare to the normative population and indicate clinical significance. Each child's CBCL scores were compared to their initial CBCL scores to determine any changes. A content analysis was completed on the additional open-ended question and presented in narrative form.

## **DATA ANALYSIS**

Of the sample N=62, nine were returned undeliverable. Sixteen CBCLs were returned completed, a response rate of 25%. Eleven CBCLs were returned uncompleted, as requested of those parents who did not want to participate. These eleven in addition to the remaining 36 reflect that 75% of the sample chose not to participate.

Of the sixteen eligible respondents twelve were not included for the final sample. One was rejected for failure to return the consent form. Another had an initial test that did not meet the time frame criteria. Six additional responses were eliminated due to inability to locate their initial CBCLs. Another was eliminated because, although the child had been living with the grandparents at the time the initial CBCL was completed, he had since returned to the care of his mother and the grandmother completed the survey response on hearsay and recollection. After discovering that the competence scales for the initial CBCL weren't scored, the decision to disqualify another respondent was made. One other was additionally unusable because the number of blank responses rendered it non-scoreable according to the manual (Achenbach, 1991). The final sample yielded four boys (n=4).

The respondents represented three of the four counties. Annual family income was in the range of \$2,000.00 - \$26,000.00+. Parental trades were blue collar jobs except one mother who was a registered nurse. The current age of the children participating in the study ranged from 10 to 15.

Each CBCL was hand scored according to the CBCL Manual directions (Achenbach, 1991). Each was plotted on a Profile (Appendix B) for Competence and Problem scores along with the initial test results. This dual plotting offered a visual presentation of score changes after treatment intervention. Plotting the raw data on the profile provides the clinician with reference of where the score lies in the normal range as compared to the normative population for that age group or if the child's score is in the borderline or clinically deviant range. Additionally, the CBCL profile provides a T Score for totals of raw data. This score provides a method to normalize the raw data totals and rank them in the normal to clinical continuum. The rationale and mathematical formulation used to standardize competency and problems scores, yielding the T Score, are explained and supported in the CBCL manual (Achenbach, 1991).

For the competence scales, as raw scores and T Scores *increase*, the score moves toward or into the *normal* range. Lower scores fall into the borderline and clinical range. Greater participation in activities, number of friends, and adequate school performance score higher and indicate greater competency.

The problem scales read inversely. Fewer behavioral problems, hence a *lower* raw and T Score, plot in the *normal* range. As behavioral problem scores increase the raw data score and T Score move into the borderline and clinical range.

Tables 1 and 2 were designed to provide the reader with "before" and "after" raw and T scores between the initial CBCL and survey response CBCL. A total change was computed to provide a sense of raw score within the normal and clinical continuum. Additionally, average change was computed to provide an assessment of the sample group's change. Table 1 provides this information for competence scales. Table 2 provides this information for problem scales including the broad headings for internalizing and externalizing symptoms.

For each individual survey respondent a graph was plotted to demonstrate score change between the initial CBCL completed at intake and the current status reported in the survey response. These graphs plot the "before" and "after" T Scores in relation to their placement on the normal and clinical continuum, referred to in Appendix B. Figures 1, 2, 3, and 4 show the boys' competence scales. Problem scales are shown in Figures 5, 6, 7 and 8, categorizing the syndromes under the internalizing and externalizing headings.



## **FINDINGS**

### **Male 1 -**

M1 was a seven year old male referred to the MHCNI for noncompliant behavior and behavioral outbursts. He was 7 years old at the intake and 11 at the time the second CBCL was completed for a post score. His mother completed both CBCLs.

#### **Competence Scales**

The initial Competency Scales for this boy reflected an activity score of 5.0, within the normal range. His social score was 4.0 and school score was 3.5. Although they too were in the normal range, both were close to entering the borderline clinical range. The total raw data competence score was 12.5, and T Score of 34, falling within the borderline range.

This child's second competence profile in response to this research study exhibited an increase in activity level with a raw score of 7.0, within the normal range. His raw social score was unchanged at 4.0. The raw score for the school category increased to 4.0. These categories totaled a raw score of 14 and T Score of 40, within the borderline range.

"Before" and "After" scores are displayed in Table I.

The difference between the initial and respective T Scores is shown in Table 1. As perceived by his mother, M1's protective factors increased in the time between intake and survey response, although remained lower than the normative population (Figure 1).

A qualitative analysis of the mother's responses indicated that this boy is involved with a two sports activities and one club. He also plays an

instrument for a hobby. This child also has regular household chores and is required to help care for a younger sibling. Strengths indicated by his mother are his willingness to "give you a hug when you least expect it" and "help in any way he can."

#### Problem Scales

The initial problem scale profile for M1 produced a raw score of 5 within the normal range of the withdrawn syndrome behaviors. Somatic complaints were also scored within the normal range with a raw score of 3. A clinically significant raw score of 12 was reflected in the anxious/depressed syndrome. The initial T Score for these combined internalized syndromes produced a score of 72.

The externalizing syndrome of delinquent behavior in the initial CBCL had a raw score of 2, within the normal range. The aggressive behavior subset scored 12. A total raw score of 14 and T Score of 56 were the sum of these externalizing symptoms. This total score was in the normal range as compared to the normative population. Table 2 shows these initial raw and T Scores by syndrome scales within categories of internalizing and externalizing.

For the second CBCL, a raw score of 6 was reported for the withdrawn behavior subset, falling on the beginning point of the borderline range. A score of 2, within the normal range, was shown in the syndrome for somatic complaints. The anxious/depressed subset's raw score entered the borderline clinical range with a score of 11. The total T score for internalizing was 71 and raw score total of 19 were clinically significant.

These scores reflected a general improvement toward the normal range as compared to the initial CBCL "before" score (Figure 6).

Externalizing syndrome subsets reported an "after" score of 2 for delinquent behavior and 15 for aggressive behavior. Both were within the normative population range. The total raw score of 17 corresponded to the T Score of 60 for the externalizing grouping. These scores reflected an "after" score within the borderline range, with movement toward the clinical range (Figure 6).

#### **Male 2 -**

M2 was referred to the MHCNI for depressive symptoms, mood fluctuations, and "hyper" behavior at age 11. His stepmother completed the CBCL at intake and for the survey response. He was 14 at the time the CBCL survey was completed.

#### **Competence Scales**

The initial response reflected a competency score for activities of 5.0 within the normal range. A social score 3.0 and school score of 4.0 were both in the low normal range. The total raw score was 12 with a T Score of 33, nearing the borderline clinical range. Raw scores for M2's initial competence scale are displayed in Table 1.

The CBCL completed in response to the survey illustrated a similar profile. A score of 7.0 for activities reflected an increase in this category as compared to the initial CBCL. Social competence score was the same score as at intake, 3.0. A slight drop in the school competence score at

3.0 was still in the normal range. The combined competence "after" score was 13 with a corresponding T Score of 35. These scores were in the normal range and are shown in Table 1. M2 displayed an increase in the presence of competency indicators as compared before and after intervention (Figure 2).

A qualitative analysis of competence yielded the presence of many opportunities for good psychosocial development through involvement with activities. He has several chores as well. His strengths, according to his step-mother included being "likable" and "baking with step-mom and dad."

#### Problem Scales

Under the internalizing heading for the problem scale profile, a raw score of 10 was initially plotted in the clinical range for the syndrome of withdrawn behaviors. Somatic complaints, however, reached the normal range with a score of 2. Anxious and depressed indicators produced a score of 17 reflecting significant deviance from the normative population. A total raw score under the internalizing heading was 29 with a corresponding T Score of 78 (Table 2).

The initial CBCL for M2 referenced clinically significant scores of 8 under the externalizing heading for delinquent behavior and 23 for aggressive behavior. The total raw score was 31 and T Score was 72.

The subsequent CBCL completed for this survey reflected a movement toward the normal range for internalizing syndromes. For example, although still in the clinical range, a score of 9 was tallied for withdrawn

indicators. Somatic complaints fell into the clinical range with a raw score of 5 but anxious/depressed symptoms advanced toward the normal range with a score of 12. Total raw score was 26 and a T Score for this "after" data was 74. Figure 7 shows a slight movement from the clinical range to the normal range for internalizing symptoms.

Subsets under the externalizing heading reflected minimal movement toward the normal range in the subsequent CBCL. Delinquent behavior was scored as 5 on the second CBCL and aggressive behavior, 19. The total raw score of 24 and T Score of 67 (Figure 7) remained in the clinical range.

### **Male 3 -**

M3 was referred to the MHCNI for depression, mood swings, and "hyper" behavior. His mother completed the initial CBCL at intake and in response to the research survey. This youth was age 10 at the time both were completed.

#### **Competence Scales**

His "before" and "after" scores for the CBCLs revealed identical scores. The competence profile had scores of 7.0, 9.0 and 3.0 for activities, social, and school categories respectively. The school competence score was the only one in the clinical range. The total raw score of 19 and T Score of 51 were identical between the two CBCLs as well (Table 1).

A qualitative assessment of the competence portion showed that this boy had many extracurricular activities such as sports, clubs, and hobbies. Household chores and helping with child care were also part of his competencies. Additionally, the mother indicated that he has an altruistic quality and extroverted personality.

#### Problem Scales

The problem scales for his initial CBCL under the internalizing heading were within the normal range. Withdrawn syndrome behaviors were scored 0, somatic complaints 1, and anxious/depressed behaviors 4. The total raw score was 5 and T Score was 51.

This child showed clinically significant scores for externalizing behaviors on the initial CBCL. For example, delinquent behavior was plotted at 7 and aggressive behavior at 21. The total score of 28 and T Score of 71 were subsequently within the clinical range as well.

In the survey response, there was no change in the scores for withdrawn behaviors (0) and somatic complaints (1) in the internalizing grouping. The score for anxious/depressed symptoms was 6, still within the normal range. The total post score for externalizing behaviors was 19 with a corresponding T Score of 25 (Table 2). Internalizing behaviors moved toward the clinical range and externalizing behaviors moved toward the borderline clinical range although remained in the clinical range (Figure 8).

#### **Male 4 -**

M4 was a 12 year old referred to the MHCNI for legal trouble as a result of stealing. Parent/child problems were also identified as a goal of intervention. His mother completed both the initial and subsequent CBCLs. M4 was 15 years old at the time the second CBCL was completed.

#### **Competence Scales**

At the initial intake M4 had an activity score 4.0 within the normal range. His greatest deficit in the competence profile at this time was with social activities and friends, indicated by a clinical score of 0. The school raw score was in the borderline clinical range, plotted on 2.0. The total competence score was 6 with a corresponding T Score of 21 (Table 1).

The "after" scores indicated on the second CBCL showed some improvement. The activity score was 7.0, again in the normal range. Additionally, the social score moved closer to the borderline range with a score of 3.0. The school score remained in the clinical range with a raw score of 1.5. The total score for this post CBCL competence scale was 11.5 and a T Score of 32, lying within the clinical range.

A qualitative analysis of the survey CBCL indicated that this boy has very few activities or hobbies outside the home. He was not involved in any clubs, teams or organizations. He did however, have household and regular farm chores. His mother felt his greatest strength was his intelligence.

### Problem Scales

This youth's profile indicated an initial CBCL score of 9 for withdrawn symptoms under the internalizing heading. This score was clinically significant compared to the normative population. Somatic complaints fell within the clinical range with a score of 8 as did the anxious/depressed syndrome with a score of 17. These scores and the total raw score of 30 and T Score of 80 are referenced in Table 2.

On the same initial problem scale profile the externalizing syndromes of delinquent behavior and aggressive behavior indicated clinical scores of 12 and 36 respectively (Table 2). A total score of 48 and T Score of 84 indicated clinical significance as well.

On the second checklist under the internalizing heading, withdrawn indicators were plotted as 3, again within the normal range. Somatic complaints with a score of 4 and anxious/depressed behaviors moved into the borderline range with a score of 12. A total raw score of 19 with corresponding T Score of 69 shows that although the behavior scores remain in the clinical range, there was movement toward the normal range. Delinquent behavior yielded an "after" score of 9. Aggressive behavior improved greatest with a score of 14. Total raw score for these external syndromes was 23, T Score 67. Table 2 displays the difference between the scores for the initial and survey response. Additionally, Figure 9 reflects the "before" and "after" change for the internalizing and externalizing behaviors.



A general overview of the findings shows an 11.5% increase in competence scores among the boys. Problem scales reflected a varying degree of change for each individual but overall the greatest change toward improvement was in the aggressive behavior syndromes under the externalizing heading. It should be noted that due to the small sample size, any changes can be attributed to chance.

#### **Qualitative Analysis of Question #114 -**

**Question #114:** Please provide any further information you wish to share or questions you may have.

**M1** - This boy's mother used this question to ask for guidance in parenting. Communication, attention and power struggles were common themes: "How do you get threw (sic) to a child and not lose your cool?" If he does not get the answer "he wants to hear then he will start arguing with me." "He doesn't understand why I can do something and he can't. Tried to explain to him, but he won't listen."

**M2** - The stepmother expressed concerns with the boy's biological mother and how the relationship creates confusion for him: "Child abuse/neglect charges from biological mom of boyfriend. It was founded." Biological mom "was instructed to seek psych help - hasn't done so. M2 had different dad - many lies were told to M2 - that he was dead, drug user, etc. People just use you."

**M3** - The mother spoke positively about the MHCNI services and how they have helped the child with school work however, school problems remain: "Since we have started here M3 very much looks forward to talking with (therapist). Medication...has stopped his bed wetting, which makes him feel better about himself. It also helps him stay more focused on his school work. One problem though he complained that when ever there is a fight at shool that no one will listen to him they just all blame him and he is punish (sic) this makes him angry any suggestions???"

**M4** - had no response to question #114.

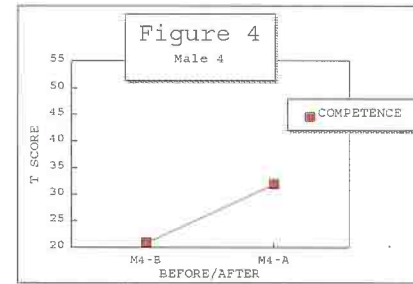
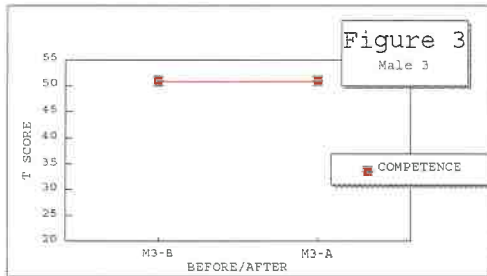
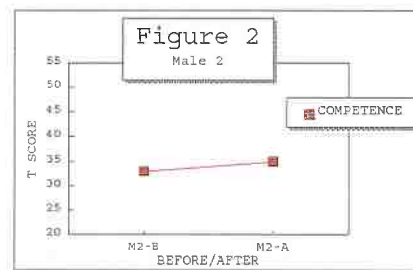
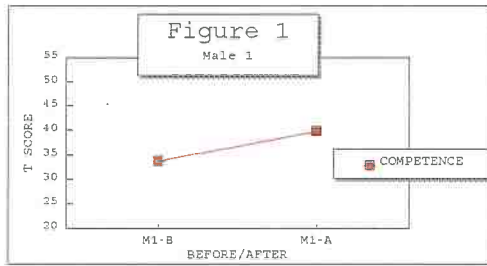
**TABLE I**      **COMPETENCE SCALES FOR CBCL PROFILES**

<b>CLIENT</b>	<b>ACTIVITY</b>	<b>SOCIAL</b>	<b>SCHOOL</b>	<b>TOTAL</b>	<b>T SCORE</b>
M1-B	5.00	4.00	3.50	12.50	34.00
M1-A	7.00	4.00	4.00	15.00	40.00
CHANGE	2.00	0.00	0.50	2.50	6.00
M2-B	5.00	3.00	4.00	12.00	33.00
M2-A	7.00	3.00	3.00	13.00	35.00
CHANGE	2.00	0.00	-1.00	1.00	2.00
M3-B	7.00	9.00	3.00	19.00	51.00
M3-A	7.00	9.00	3.00	19.00	51.00
CHANGE	0.00	0.00	0.00	0.00	0.00
M4-B	4.00	0.00	2.00	6.00	21.00
M4-A	7.00	3.00	1.50	11.50	32.00
CHANGE	3.00	3.00	-0.50	5.50	11.00
AVG B	5.25	4.00	3.13	12.38	34.75
AVG A	7.00	4.75	2.88	14.63	39.50
AVG CHG	1.75	0.75	-0.25	2.25	4.75

TABLE II. PROBLEM SCALES FOR CBCL PROFILES

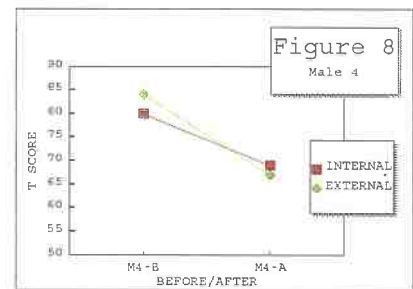
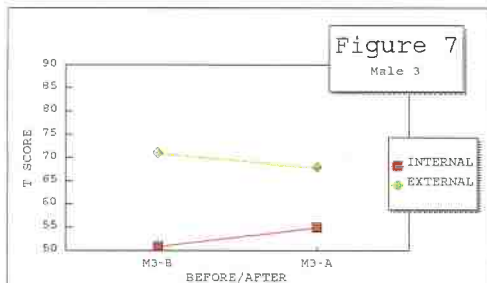
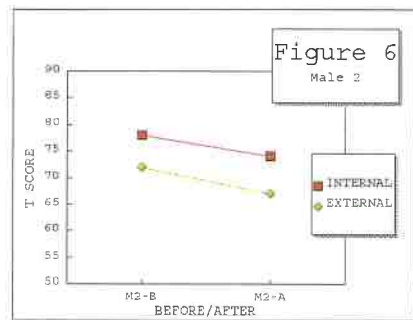
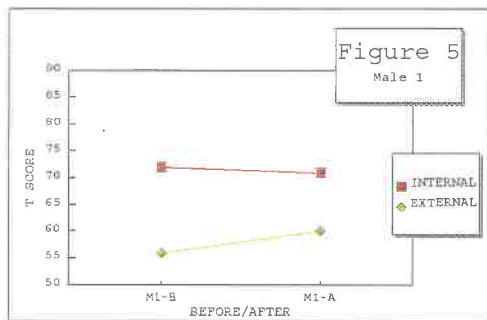
CLIENT	INTERNALIZING					EXTERNALIZING			
	WITHDRAWN	SOMATIC COMPLAINTS	ANXIOUS/ DEPRESSED	TOTAL	T SCORE	DELINQUENT BEHAVIOR	AGGRESSIVE BEHAVIOR	TOTAL	T SCORE
M1-B	5	3	12	20	72	2	12	14	56
M1-A	6	2	11	19	71	2	15	17	60
CHANGE	1	-1	-1	-1	-1	0	3	3	4
M2-B	10	2	17	29	78	8	23	31	72
M2-A	9	5	12	26	74	5	19	24	67
CHANGE	-1	3	-5	-3	-4	-3	-4	-7	-5
M3-B	0	1	4	5	51	7	21	28	71
M3-A	0	1	6	7	55	6	19	25	68
CHANGE	0	0	2	2	4	-1	-2	-3	-3
M4-B	9	8	17	34	80	12	36	48	84
M4-A	3	4	12	19	69	9	14	23	67
CHANGE	-6	-4	-5	-15	-11	-3	-22	-25	-17
AVG B	6.00	3.50	12.50	22.00	70.25	7.25	23.00	30.25	70.75
AVG A	4.50	3.00	10.25	17.75	67.25	5.50	16.75	22.25	65.50
AVG CHG	-1.50	-0.50	-2.25	-4.25	-3.00	-1.75	-6.25	-8.00	-5.25

#### COMPETENCE SCALES



Figures 1-4. Competence scales for "Before" and "After" CBCL Profiles. Refer to Appendix B for Normal - Clinical ranges.

#### PROBLEM SCALES



Figures 5-8. Internal/External problem scales for "Before" and "After" CBCL Profiles. Refer to Appendix B for Normal - Clinical ranges.

## **DISCUSSION**

The thesis research question, "Based on parental perception, has there been any change in characteristics of resiliency in children served by the MHCNI?", was not adequately supported. The study findings did not indicate a change significant enough to claim a change in characteristics of resiliency. The purpose of this endeavor however, was to identify protective factors as indicated by competence, assess poor risk outcomes as evidenced by internal and external problems and observe any change in these areas. Toward this end, the research was successful.

The CBCL provided a means by which to determine the level of competency and behavioral problems as compared to a normative population at the initial intake and after intervention. Determining individual change and overall sample trends for competence and problem scales was also successful, although limited in validity. Although each individual experienced varying degrees of change in competency and problem outcomes, overall there was minimal change in the presence of protective factors and only the syndrome of aggressive behavior yielded a significant change for the sample population.

The overall improvement of aggressive behavior was to be expected in the context of a therapeutic intervention whose primary goal is

symptom management. Subsequently, based on this primary treatment goal the minimal change in competency scores is also of no surprise.

The findings are not significant enough to support the conclusions of other resiliency research however, the poor behavioral outcomes exhibited by these boys support the adverse affects risk factors have on healthy growth and development. Although the CBCL does not provide an exhaustive assessment, this research study does show that the CBCL can be used as a measurement tool for the effects of risk factors on adaptation and for assessing existing protective factors.

This research study has additionally contributed to the pool of resiliency research. More significantly, it contributes to the clinical practice at the MHCNI by demonstrating how the CBCL can provide clinicians an instrument by which to assess competence and poor outcome. Coupled with increased knowledge of the resiliency process provided in the thesis literature review, clinicians can use this research endeavor as a paradigm shift for the approach to symptom management.

Theoretical implications of the research findings include the confirmed effectiveness of psychotherapy interventions in addressing presenting problems. Additionally, it is possible, therefore, to consider an increase in competency skills may result from a clinician's knowledge of protective factors and their role in the resiliency process. Another theoretical implication is the incongruity between the resiliency process and practice interventions based on the medical model. The medical model identifies the individual as the unit of change whereas the process of resiliency

involves a constant interaction between the individual and the environment. Therefore, it is up to the clinician to augment the treatment of symptoms with a systems perspective in an effort to foster resiliency in children.



## **IMPLICATIONS**

The implications of this research study and other resiliency research for social work practice range from the micro to macro levels. At the micro level, working with children one-on-one as at the MHCNI, social workers can foster existing protective factors within the individual such as autonomy, self-help skills, personal goals and internal locus of control. To some extent these skills can also be taught. The therapist/client relationship can also serve as the critical protective factor of a positive relationship with a caring adult.

Addressing the child's social skills moves the therapeutic focus away from the individual. Social competence and good peer relations function as protective buffers from adverse life conditions. Social workers can nurture these skills by facilitating peer support groups or social activities.

Social workers and other child welfare professionals can move the resiliency fostering process beyond the identified patient to the family systems level. For example, educating parents about what factors serve as protective mechanisms for their children empowers the caretaker to facilitate resiliency. Osborn (1990) found that children whose parents read to them, indicating child-centeredness, were twice as likely to demonstrate competence. Similarly, Joseph (1994) supports the importance of reading children stories with themes of resiliency. Additionally, parents may be encouraged to explore extracurricular

activities for their child. Trying various hobbies may also help the parent/child relationship and give the child a sense of pride. Helping the parent help the child in becoming resilient despite adversity is a critical social work intervention.

At the macro level, social workers can network with community resources to facilitate resiliency. Mentoring programs such as Big Brothers/Big Sisters provide children with a positive role model and serve to foster the protective factor of a caring adult/child relationship. Schools can additionally be community institutions that nurture self-esteem, intellect, and social skills. Youth programs and clubs are also critical players in the resiliency process through providing opportunities for interpersonal development and pride. Churches additionally provide a sense of belonging, hope and faith for children.

Social policy can also be structured around the findings of resiliency research by implementing comprehensive interventions that include preventive models rather than policies that encourage repression of social problems.

Through the basic social work functions of networking resources for clients, educating other professionals about resiliency, and mobilizing community agencies to foster resiliency in children the opportunities for successful adaptation among children are increased.

## **LIMITATIONS**

There are several limitations of this research study. Resiliency is a difficult variable to study because it involves measuring the equilibrium between risk and protective factors. A common limitation in resiliency research is the difficulty of designing and executing a carefully controlled study of the resiliency process. The purpose of the present study was exploratory in nature and was limited in its ability to detect the resiliency process in sample subjects.

An additional limitation of this research endeavor was the time frame. Although few longitudinal studies have been completed on resiliency, the present study has considerable limitations due to the short time frame of data collection and analysis. The sample population was only given 14 days to respond to the survey. This time restriction narrowed the potential breadth of the study in that potential respondents may not have had adequate time to participate.

Sample restrictions present the greatest limitation of this study. Sample size, for example, was restricted by the frequency of which clinicians use the CBCL. Although the CBCL is an established psychological testing tool at the MHCNI, it is used selectively rather than routinely and used infrequently by the clinical social workers.

The two and one-half year service time frame for the sample population and the poor response rate also present limitations for the

study. The former restricted the sample size to only those children given the CBCL during the specified time frame. The latter limitation was to be expected given the difficult chronic conditions many of the client families experience and personal commitment required in survey participation.

The small size of the sample also limits the research findings in that chance can not be ruled out in data results. Additionally, the small amount of participants affects external validity, making the findings non-generalizable to other populations.

The final sample population was also biased in that it consisted exclusively of Caucasian boys and therefore was not generalizable to minorities or females.

External validity was also compromised by using a selective sample. Because of the non-uniform use of the measurement instrument, only selective individuals were asked to participate. Additionally, there was no control group to compare findings against. Rather, the normative population data used in the CBCL design served this purpose. Finally, the sample population was restricted to only clients of the MHCNI, limiting the sample frame and external validity.

The measurement instrument presented limitations for this research as well. For example, the CBCL only measures a portion of the protective factors identified in the resiliency research. It is possible, for example, that a child could score in the clinical range of the competence scales and still have other protective mechanisms not measured by the CBCL.

The CBCL was also designed for white, middle class youth (Achenbach, 1991) and although this design bias does not grossly bias these findings, they can not be compared or generalized to minority populations. Additionally, because the resiliency process involves interaction between the individual and his/her environment, cultural variables must be accounted for. This study did not address cultural influences.

Although the CBCL served an adequate purpose in measuring protective factors and poor outcome, this research design did not include triangulation to strengthen the findings. The use of other measurement instruments to validate the CBCL findings and control for extraneous variables would have strengthened the study's reliability and external validity.

Extraneous variables and the lack of control for them are other significant limitations of this study. For example, length of service and clinician style could influence protective factors and outcomes. Parental characteristics and family changes between the two tests would also influence findings. Finally, changes in child's competence and problem scales could be affected by developmental factors. The study design used only age information to control for this possible intervening variable.

Although the risks for participation in this study were minute, the lack of anonymity for survey participants also served as a study limitation. Possible respondents may have felt unsure or suspicious about responding because it was not anonymous. The MHCNI is a major

provider of mental health services in the area and networks with many other agencies. Potential respondents may have felt a threatening sense of being monitored and therefore declined to participate.

## **CONCLUSIONS**

"Human psychological development is highly buffered and self-righting" (Masten, et al., 1990, p. 438). The children in this research study exemplify this adaptive nature. Despite the risk factors influencing healthy growth and development, some level of competence was found within each of the children. The challenge often lies in finding these strengths in children who are behaviorally disordered.

Social work has integrated the strengths perspective into its professional foundation. Therefore, the study of variables that serve as protective factors and how they buffer adversity is conducive to social work research and practice. Additionally, the context of the resiliency process fits the application of systems theory to social work practice. The profession therefore, can apply the findings of resiliency research in the development of interventions.

Tailoring interventions to foster the individual's competencies and adaptive processes serves a preventive purpose in addition to meeting immediate needs. In this sense, mental health models can take a proactive approach to complex problems (Cowen & Work, 1988). This thesis research endeavor serves to encourage clinicians at the MHCNI to utilize the CBCL and other instruments to look for strengths upon which to build intervention models.

Knowledge of the *processes* involved in resiliency and what factors promote recovery and serve to compensate for adverse life conditions is

the basis for future research. Collaboration between clinicians and researchers will promote these findings. When interventions include both crisis management and preventive maintenance, the probability for adaptation and healthy growth and development increases.

The human spirit is intrinsically resilient as seen by the perpetuation of the species. It isn't however, invincible. It is at times when children demonstrate their nearing threshold for tolerance to adversity that human service interventions based on identifying and fostering resiliency can provide immediate support and future adaptive skills.



## REFERENCES

Achenbach, T.M. (1990). What is "developmental " about developmental psychopathology? In J. Rolf, A.S. Masten, D.Cicchetti, K.H. Nuechterlein, & S. Weintraub (Eds.), Risk and protective factors in the development of psychopathology (pp. 29-51). New York: Cambridge University Press.

Achenbach, T. (1991). Manual for the child behavior checklist/4-18. Burlington, VT: Thomas Achenbach, University Vermont.

Beardslee, W.R. (1989). The role of self-understanding in resilient individuals: The development of a perspective. American Journal of Orthopsychiatry, 59, 266-278.

Beardslee, W.R., and Podorefsky, M.A. (1988). Resilient adolescents whose parents have serious affective and other psychiatric disorders: Importance of self-understanding and relationships. American Journal of Psychiatry, 145, 63-69.

Block, J.H., & Block, J. (1980). The role of ego-control and ego-resilience in organization of behavior. In W.A. Colline (Ed.), Minnesota symposia on child psychology (Vol. 13, pp. 39-101). Hillsdale, NJ: Lawrence Erlbaum Associates.

Cowen, E.L., & Work, W.C. (1988). Resilient children, psychological wellness, and primary prevention. American Journal of Community Psychology, 16, 591-606.

Cowen, E.L., Wyman, P.A., Work, W.C., & Parker, G.R. (1990). The Rochester child resilience project: Overview and summary of the first year findings. Development and Psychopathology, 2, 193-212.

Earls, F., Beardslee, W., & Garrison, W. (1987). Correlates and predictors of competence in young children. In E.J. Anthony, & B.J. Cohler (Eds.), The invulnerable child. New York: The Guilford Press.

Garnezy, N., & Devine, V. (1984). Project competence: the Minnesota studies of children vulnerable to psychopathology. In N.F. Watt, E.J. Anthony, L.C. Wynn, & J.E. Rolf (Eds.), Children & risk for schizophrenia (pp. 289-303). Cambridge: Cambridge University Press.

Garnezy, N., Masten, A.S., & Tellegen, A. (1984). The study of stress and competence in children: A building block for developmental psychopathology. Child Development, 55, 97-111.

Garnezy, N., & Masten, A.S. (1986). Stress, competence, and resilience: Common frontiers for therapist and psychopathologist. Behavior Therapy, 17, 500-521.

Garnezy, N., & Masten, A.S. (1990). The adaptation of children to a stressful world: Master of fear. In L.E. Arnold (Ed.), Childhood stress, (pp. 459-473). New York: John Wiley.

Garnezy, N., & Rutter, M. (1983). Stress, coping, and development in children. New York: McGraw-Hill.

Garnezy, N. (1991). Resiliency and vulnerability to adverse developmental outcomes associated with poverty. American Behavioral Scientist, 34, 416-430.

Gilfix, J.E. (1992). Resiliency factors in preschool children at risk. Unpublished master's thesis, College of Saint Chatherine and University of Saint Thomas, Minneapolis, MN.

Green, M. (1991). On making a difference. Pediatrics, 87, 712-718.

Hauser, S.T., Vieyra, M.A.B., Jacobson, A.M., & Wertlieb, D. (1985). Vulnerability and resilience in adolescence: Views from the family. Journal of Early Adolescence, 5, 81-100.

Joseph, J.M. (1994). The resilient child: Preparing today's youth for tomorrow's world. New York: Plenum Press.

Kauffman, C., Grunebaum, H., Cohler, & B., Gamer, E. (1979). Superkids: Competent children of psychotic mothers. American Journal of Psychiatry, 136, 398-402.

- Luthar, S. S. (1991). Vulnerability and resilience: A study of high risk adolescents. Child Development, 62, 600-616.
- Luthar, S.S., & Zigler, E. (1991). Vulnerability and competence: A review of research on resilience in childhood. American Journal of Orthopsychiatry, 61, 6-22.
- Masten, A.S., Best, K.M., & Garmezy, N. (1990). Resilience and development: Contributions from the study of children who overcome adversity. Development and Psychopathology, 2, 435-444.
- Masten, A.S. (1994). Resiliency in individual development: Successful adaptation despite risk and adversity. In Wang, M.C., & Gordon, E. (Eds.), Educational resilience in inner-city America: Challenges and prospects (pp. 3-25). Hillsdale, NJ: Lawrence Erlbaum.
- Masten, A.S., Morison, P., Pellegrini, D., & Tellegen, A. (1990). Competence under stress: risk and protective factors. In J. Rolf, A.S. Masten, D. Cicchetti, K.H. Nuechterlein, & S. Weintraub (Eds.), Risk and protective factors in the development of psychopathology, (pp 236-356). New York: Cambridge University Press.
- Miller, D., & Jang, M. (1977). Children of alcoholics: A 20 year longitudinal study. Social Work Research and Abstracts, 13(4), 23-29.
- Mrazek, P., & Mrazek, D.A. (1987). Resilience in child maltreatment victims: A conceptual exploration. Child Abuse and Neglect, 11, 357-366.
- Murphy, L.B., & Moriarty, A.E. (1976). Vulnerability, coping and growth: From infancy to adolescence. New Haven: Yale University Press.
- Neighbors, B., Forehand, R., & McVicar, D. (1993). Resilient adolescents and interparental conflict. American Journal of Orthopsychiatry, 63, 462-471.
- O'Grady, D., & Metz, R. (1987). Resilience in children at high risk for psychological disorder. Journal of Pediatric Psychology, 12, 3-23.

Osborn, A.F. (1990). Resilient children: A longitudinal study of high achieving socially disadvantaged children. Early Child Development and Care, 62, 23-47.

Pelligrini, D.S. (1990). Psychosocial risk and protective factors in childhood. Developmental and Behavioral Pediatrics, 11, 201-209.

Rolf, J., Masten, A.S., Cicchetti, D., Neuchterlein, K.H., & Weintraub, S. (Eds.). (1990). Risk and protective factors in the development of psychopathology. New York: Cambridge University Press.

Rutter, M. (1985). Resilience in the face of adversity. British Journal of Psychiatry, 147, 598-611.

Rutter, M. (1987). Psychosocial resilience and protective mechanisms. American Journal of Orthopsychiatry, 57, 316-331.

Werner, E.E. (1984). Resilient children. Young Children, 40, 68-72.

Werner, E.E. (1985). Resilient offspring of alcoholics: A longitudinal study from birth to age 18. Journal of Studies on Alcohol, 47, 34-40.

Werner, E.E. (1989). High risk children in young adulthood: A longitudinal study from birth to 32 years. American Journal of Orthopsychiatry, 59, 72-81.

Werner, E.E., and Smith, R.S. (1982). Vulnerable but invincible: A study of resilient children. New York: McGraw-Hill.

Wertlieb, D., Weigel, C., & Feldstein, M. (1987). Measuring children's coping. American Journal of Orthopsychiatry, 57, 548-560.

White, B.L., Kaban, B.T., & Attanuri, J.S. (1979). The origins of human competence: Final report of the Harvard Preschool Project. Lexington, MA: D.C. Heath.

Wright, M.O., & Masten, A.S. (in press). Vulnerability and resilience in young children. In S.I. Greenspan, J.D. Osofsky, & E. Pruett (Eds.), Handbook of child and adolescent psychiatry: Infant and early childhood: Theory and issues. New York: Basic Books.

Zunz, S.J., Turner, S., & Norman, E. (1993). Accentuating the positive: Stressing resiliency in school-based substance abuse prevention programs. Social Work in Education, 15, 169-176.

# CHILD BEHAVIOR CHECKLIST FOR AGES 4-18

For office use only  
ID # \_\_\_\_\_

CHILD'S NAME _____			PARENTS' USUAL TYPE OF WORK, even if not working now. (Please be specific—for example, auto mechanic, high school teacher, homemaker, laborer, lathe operator, shoe salesman, army sergeant.) FATHER'S TYPE OF WORK: _____ MOTHER'S TYPE OF WORK: _____		
SEX <input type="checkbox"/> Boy <input type="checkbox"/> Girl	AGE _____	ETHNIC GROUP OR RACE _____	THIS FORM FILLED OUT BY: <input type="checkbox"/> Mother (name): _____ <input type="checkbox"/> Father (name): _____ <input type="checkbox"/> Other—name & relationship to child: _____		
TODAY'S DATE Mo. _____ Date _____ Yr. _____		CHILD'S BIRTHDATE Mo. _____ Date _____ Yr. _____			
GRADE IN SCHOOL _____	Please fill out this form to reflect <i>your</i> view of the child's behavior even if other people might not agree. Feel free to write additional comments beside each item and in the spaces provided on page 2.				
NOT ATTENDING SCHOOL <input type="checkbox"/>					

<b>I. Please list the sports your child most likes to take part in.</b> For example: swimming, baseball, skating, skate boarding, bike riding, fishing, etc. <input type="checkbox"/> None a. _____ b. _____ c. _____	<b>Compared to others of the same age, about how much time does he/she spend in each?</b> <table style="width: 100%; text-align: center;"> <tr> <th>Don't Know</th> <th>Less Than Average</th> <th>Average</th> <th>More Than Average</th> </tr> <tr> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> </tr> <tr> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> </tr> <tr> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> </tr> </table>	Don't Know	Less Than Average	Average	More Than Average	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<b>Compared to others of the same age, how well does he/she do each one?</b> <table style="width: 100%; text-align: center;"> <tr> <th>Don't Know</th> <th>Below Average</th> <th>Average</th> <th>Above Average</th> </tr> <tr> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> </tr> <tr> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> </tr> <tr> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> </tr> </table>	Don't Know	Below Average	Average	Above Average	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Don't Know	Less Than Average	Average	More Than Average																															
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>																															
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>																															
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>																															
Don't Know	Below Average	Average	Above Average																															
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>																															
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>																															
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>																															
<b>II. Please list your child's favorite hobbies, activities, and games, other than sports.</b> For example: stamps, dolls, books, piano, crafts, cars, singing, etc. (Do not include listening to radio or TV.) <input type="checkbox"/> None a. _____ b. _____ c. _____	<b>Compared to others of the same age, about how much time does he/she spend in each?</b> <table style="width: 100%; text-align: center;"> <tr> <th>Don't Know</th> <th>Less Than Average</th> <th>Average</th> <th>More Than Average</th> </tr> <tr> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> </tr> <tr> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> </tr> <tr> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> </tr> </table>	Don't Know	Less Than Average	Average	More Than Average	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<b>Compared to others of the same age, how well does he/she do each one?</b> <table style="width: 100%; text-align: center;"> <tr> <th>Don't Know</th> <th>Below Average</th> <th>Average</th> <th>Above Average</th> </tr> <tr> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> </tr> <tr> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> </tr> <tr> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> </tr> </table>	Don't Know	Below Average	Average	Above Average	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Don't Know	Less Than Average	Average	More Than Average																															
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>																															
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>																															
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>																															
Don't Know	Below Average	Average	Above Average																															
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>																															
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>																															
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>																															
<b>III. Please list any organizations, clubs, teams, or groups your child belongs to.</b> <input type="checkbox"/> None a. _____ b. _____ c. _____	<b>Compared to others of the same age, how active is he/she in each?</b> <table style="width: 100%; text-align: center;"> <tr> <th>Don't Know</th> <th>Less Active</th> <th>Average</th> <th>More Active</th> </tr> <tr> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> </tr> <tr> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> </tr> <tr> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> </tr> </table>		Don't Know	Less Active	Average	More Active	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>																
Don't Know	Less Active	Average	More Active																															
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>																															
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>																															
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>																															
<b>IV. Please list any jobs or chores your child has.</b> For example: paper route, babysitting, making bed, working in store, etc. (Include both paid and unpaid jobs and chores.) <input type="checkbox"/> None a. _____ b. _____ c. _____	<b>Compared to others of the same age, how well does he/she carry them out?</b> <table style="width: 100%; text-align: center;"> <tr> <th>Don't Know</th> <th>Below Average</th> <th>Average</th> <th>Above Average</th> </tr> <tr> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> </tr> <tr> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> </tr> <tr> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> <td><input type="checkbox"/></td> </tr> </table>		Don't Know	Below Average	Average	Above Average	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>																
Don't Know	Below Average	Average	Above Average																															
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>																															
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>																															
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>																															

## Appendix A

- V. 1. About how many close friends does your child have? ☐ None ☐ 1 ☐ 2 or 3 ☐ 4 or more  
(Do not include brothers & sisters)
2. About how many times a week does your child do things with any friends outside of regular school hours?  
(Do not include brothers & sisters) ☐ Less than 1 ☐ 1 or 2 ☐ 3 or more

VI. Compared to others of his/her age, how well does your child:

- |   | Worse                    | About Average            | Better                   |   |
|---|--------------------------|--------------------------|--------------------------|---|
| a. Get along with his/her brothers & sisters? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> Has no brothers or sisters |
| b. Get along with other kids?                 | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |   |
| c. Behave with his/her parents?               | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |   |
| d. Play and work by himself/herself?          | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |   |

VII. 1. For ages 6 and older—performance in academic subjects. If child is not being taught, please give reason \_\_\_\_\_

- |   | Failing                  | Below average            | Average                  | Above average            |
|---|--------------------------|--------------------------|--------------------------|--------------------------|
| a. Reading, English, or Language Arts   | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| b. History or Social Studies  | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| c. Arithmetic or Math   | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| d. Science  | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| e. Other academic subjects—for example: computer courses, foreign language, business. Do <i>not</i> include gym, shop, driver's ed., etc. | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| f. _____  | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| g. _____  | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |

2. Is your child in a special class or special school? ☐ No ☐ Yes—what kind of class or school?

3. Has your child repeated a grade? ☐ No ☐ Yes—grade and reason

4. Has your child had any academic or other problems in school? ☐ No ☐ Yes—please describe

When did these problems start?

Have these problems ended? ☐ No ☐ Yes—when?

Does your child have any illness, physical disability, or mental handicap? ☐ No ☐ Yes—please describe

What concerns you most about your child?

Please describe the best things about your child:

Below is a list of items that describe children and youth. For each item that describes your child **now or within the past 6 months**, please circle the 2 if the item is **very true** or **often true** of your child. Circle the 1 if the item is **somewhat** or **sometimes true** of your child. If the item is **not true** of your child, circle the 0. Please answer all items as well as you can, even if some do not seem to apply to your child.

0 = Not True (as far as you know)

1 = Somewhat or Sometimes True

2 = Very True or Often True

0	1	2	1.	Acts too young for his/her age	0	1	2	31.	Fears he/she might think or do something bad
0	1	2	2.	Allergy (describe): _____					
				_____	0	1	2	32.	Feels he/she has to be perfect
					0	1	2	33.	Feels or complains that no one loves him/her
0	1	2	3.	Argues a lot	0	1	2	34.	Feels others are out to get him/her
0	1	2	4.	Asthma	0	1	2	35.	Feels worthless or inferior
					0	1	2	36.	Gets hurt a lot, accident-prone
0	1	2	5.	Behaves like opposite sex	0	1	2	37.	Gets in many fights
0	1	2	6.	Bowel movements outside toilet	0	1	2	38.	Gets teased a lot
					0	1	2	39.	Hangs around with others who get in trouble
0	1	2	7.	Bragging, boasting					
0	1	2	8.	Can't concentrate, can't pay attention for long	0	1	2	40.	Hears sounds or voices that aren't there (describe): _____
0	1	2	9.	Can't get his/her mind off certain thoughts; obsessions (describe): _____	0	1	2	41.	Impulsive or acts without thinking
				_____					
0	1	2	10.	Can't sit still, restless, or hyperactive	0	1	2	42.	Would rather be alone than with others
0	1	2	11.	Clings to adults or too dependent	0	1	2	43.	Lying or cheating
0	1	2	12.	Complains of loneliness	0	1	2	44.	Bites fingernails
					0	1	2	45.	Nervous, highstrung, or tense
0	1	2	13.	Confused or seems to be in a fog	0	1	2	46.	Nervous movements or twitching (describe): _____
0	1	2	14.	Cries a lot					
0	1	2	15.	Cruel to animals	0	1	2	47.	Nightmares
0	1	2	16.	Cruelty, bullying, or meanness to others	0	1	2	48.	Not liked by other kids
					0	1	2	49.	Constipated, doesn't move bowels
0	1	2	17.	Day-dreams or gets lost in his/her thoughts	0	1	2	50.	Too fearful or anxious
0	1	2	18.	Deliberately harms self or attempts suicide	0	1	2	51.	Feels dizzy
					0	1	2	52.	Feels too guilty
0	1	2	19.	Demands a lot of attention	0	1	2	53.	Overeating
0	1	2	20.	Destroys his/her own things	0	1	2	54.	Overtired
					0	1	2	55.	Overweight
0	1	2	21.	Destroys things belonging to his/her family or others					
0	1	2	22.	Disobedient at home	0	1	2	56.	Physical problems without known medical cause:
					0	1	2	a.	Aches or pains ( <b>not</b> headaches)
0	1	2	23.	Disobedient at school	0	1	2	b.	Headaches
0	1	2	24.	Doesn't eat well	0	1	2	c.	Nausea, feels sick
					0	1	2	d.	Problems with eyes (describe): _____
0	1	2	25.	Doesn't get along with other kids	0	1	2	e.	Rashes or other skin problems
0	1	2	26.	Doesn't seem to feel guilty after misbehaving	0	1	2	f.	Stomachaches or cramps
					0	1	2	g.	Vomiting, throwing up
0	1	2	27.	Easily jealous	0	1	2	h.	Other (describe): _____
0	1	2	28.	Eats or drinks things that are not food — <b>don't</b> include sweets (describe): _____					
				_____					
0	1	2	29.	Fears certain animals, situations, or places, other than school (describe): _____					
				_____					
0	1	2	30.	Fears going to school					



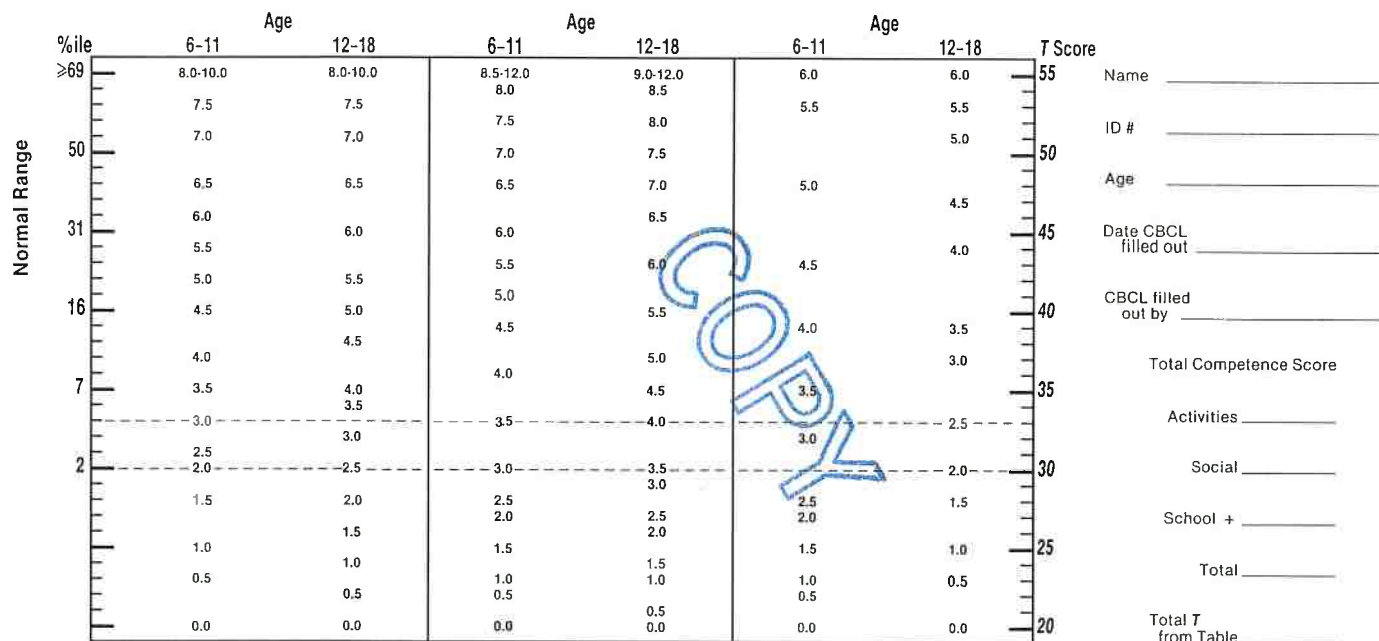
0 = Not True (as far as you know)			1 = Somewhat or Sometimes True			2 = Very True or Often True			
0	1	2	57.	Physically attacks people	0	1	2	84.	Strange behavior (describe): _____
0	1	2	58.	Picks nose, skin, or other parts of body (describe): _____					_____
					0	1	2	85.	Strange ideas (describe): _____
0	1	2	59.	Plays with own sex parts in public					_____
0	1	2	60.	Plays with own sex parts too much	0	1	2	86.	Stubborn, sullen, or irritable
0	1	2	61.	Poor school work	0	1	2	87.	Sudden changes in mood or feelings
0	1	2	62.	Poorly coordinated or clumsy	0	1	2	88.	Sulks a lot
0	1	2	63.	Prefers being with older kids	0	1	2	89.	Suspicious
0	1	2	64.	Prefers being with younger kids	0	1	2	90.	Swearing or obscene language
0	1	2	65.	Refuses to talk	0	1	2	91.	Talks about killing self
0	1	2	66.	Repeats certain acts over and over; compulsions (describe): _____	0	1	2	92.	Talks or walks in sleep (describe): _____
									_____
0	1	2	67.	Runs away from home	0	1	2	93.	Talks too much
0	1	2	68.	Screams a lot	0	1	2	94.	Teases a lot
0	1	2	69.	Secretive, keeps things to self	0	1	2	95.	Temper tantrums or hot temper
0	1	2	70.	Sees things that aren't there (describe): _____	0	1	2	96.	Thinks about sex too much
					0	1	2	97.	Threatens people
					0	1	2	98.	Thumb-sucking
					0	1	2	99.	Too concerned with neatness or cleanliness
0	1	2	71.	Self-conscious or easily embarrassed	0	1	2	100.	Trouble sleeping (describe): _____
0	1	2	72.	Sets fires					_____
0	1	2	73.	Sexual problems (describe): _____					_____
					0	1	2	101.	Truancy, skips school
					0	1	2	102.	Underactive, slow moving, or lacks energy
					0	1	2	103.	Unhappy, sad, or depressed
0	1	2	74.	Showing off or clowning	0	1	2	104.	Unusually loud
0	1	2	75.	Shy or timid	0	1	2	105.	Uses alcohol or drugs for nonmedical purposes (describe): _____
0	1	2	76.	Sleeps less than most kids					_____
0	1	2	77.	Sleeps more than most kids during day and/or night (describe): _____	0	1	2	106.	Vandalism
					0	1	2	107.	Wets self during the day
0	1	2	78.	Smears or plays with bowel movements	0	1	2	108.	Wets the bed
0	1	2	79.	Speech problem (describe): _____	0	1	2	109.	Whining
					0	1	2	110.	Wishes to be of opposite sex
0	1	2	80.	Stares blankly	0	1	2	111.	Withdrawn, doesn't get involved with others
0	1	2	81.	Steals at home	0	1	2	112.	Worries
0	1	2	82.	Steals outside the home				113.	Please write in any problems your child has that were not listed above:
0	1	2	83.	Stores up things he/she doesn't need (describe): _____					_____
					0	1	2		_____
					0	1	2		_____
					0	1	2		_____

PLEASE BE SURE YOU HAVE ANSWERED ALL ITEMS.

PAGE 4

UNDERLINE ANY YOU ARE CONCERNED ABOUT.

# CBCL Profile for Boys – Competence Scales



**ACTIVITIES**

\_\_\_ I. A. # of sports

\_\_\_ B. Mean of participation and skill in sports

\_\_\_ II. B. Mean of participation and skill in activities

\_\_\_ IV. A. # of jobs

\_\_\_ B. Mean job quality

\_\_\_ Total

**SOCIAL**

\_\_\_ III. A. # of organizations

\_\_\_ B. Mean of participation in organizations

\_\_\_ V. 1. # of friends

\_\_\_ 2. Frequency of contacts with friends

\_\_\_ VI. A. Behavior with others

\_\_\_ B. Behavior alone

\_\_\_ Total

**SCHOOL**

\_\_\_ VII. 1. Mean performance

\_\_\_ 2. Special class

\_\_\_ 3. Repeated grade

\_\_\_ 4. School problems

\_\_\_ Total

Broken lines = borderline clinical range

Not scored on competence scales

\_\_\_ II. A. Number of nonsports activities

Total Competence Scores			
Age 6-11	T	Age 12-18	T
28.0	80	28.0	80
27.5	78	27.5	79
27.0	76	27.0	77
26.5	74	26.5	75
26.0	73	26.0	72
25.5	72	25.5	70
25.0	71	25.0	69
24.5	70	24.5	67
24.0	68	24.0	65
23.5	67	23.5	63
23.0	65	23.0	62
22.5	63	22.5	60
22.0	61	22.0	58
21.5	59	21.5	57
21.0	57	21.0	56
20.5	55	20.5	54
20.0	53	20.0	53
19.5	52	19.5	51
19.0	51	19.0	50
18.5	50	18.5	48
18.0	48	18.0	47
17.5	46	17.5	46
17.0	45	17.0	45
16.5	44	16.5	43
16.0	43	16.0	41
15.5	41	15.5	40
15.0	40	15.0	39
14.5	39	14.5	38
14.0	37	14.0	37
13.5	36	13.5	36
13.0	35	13.0	35
12.5	34	12.5	34
12.0	33	12.0	33
11.5	32	11.5	32
11.0	31	11.0	31
10.5	30	10.5	30
10.0	29	10.0	29
9.5	28	9.5	28
9.0	27	9.0	27
8.5	26	8.5	26
8.0	25	8.0	25
7.5	24	7.5	24
7.0	23	7.0	23
6.5	22	6.5	22
6.0	21	6.0	21
5.0-5.5	20	5.0-5.5	20
4.5	19	4.5	19
4.0	18	4.0	18
3.5	17	3.5	17
3.0	16	3.0	16
2.5	15	2.5	15
2.0	14	2.0	14
1.5	13	1.5	13
1.0	12	1.0	12
0.5	11	0.5	11
0.0	10	0.0	10

# CBCL/4-18 Profile for Boys – Problem Scales

Name \_\_\_\_\_

AGE	Internalizing		Externalizing		T	ID #
	4-11	12-18	4-11	12-18		
18	18	18	28	28	16	16
17	17	17	27	27	15	15
16	16	16	26	26	14	14
15	15	15	25	25	13	13
14	14	14	24	24	12	12
13	13	13	23	23	11	11
12	12	12	22	22	10	10
11	11	11	21	21	9	9
10	10	10	20	20	8	8
9	9	9	19	19	7	7
8	8	8	18	18	6	6
7	7	7	17	17	5	5
6	6	6	16	16	4	4
5	5	5	15	15	3	3
4	4	4	14	14	2	2
3	3	3	13	13	1	1
2	2	2	12	12	0	0
1	1	1	11	11	0	0
0	0	0	10	10	0	0
0-1	0-1	0-1	9	9	0	0
0-2	0-2	0-2	8	8	0	0
0-2	0-2	0-2	7	7	0	0
0-2	0-2	0-2	6	6	0	0
0-2	0-2	0-2	5	5	0	0
0-2	0-2	0-2	4	4	0	0
0-2	0-2	0-2	3	3	0	0
0-2	0-2	0-2	2	2	0	0
0-2	0-2	0-2	1	1	0	0
0-2	0-2	0-2	0	0	0	0

Normal Range

## I WITHDRAWN

- 42. Rather Be Alone
- 65. Won't Talk
- 69. Secretive
- 75. Shy
- 80. Stares
- 88. Sulks
- 102. Underactive
- 103. Sad
- 111. Withdrawn
- TOTAL

## II SOMATIC COMPLAINTS

- 51. Dizzy
- 54. Tired
- 56a. Aches
- 56b. Headaches
- 56c. Nausea
- 56d. Eye
- 56e. Skin
- 56f. Stomach
- 56g. Vomit
- TOTAL

## III ANXIOUS/ DEPRESSED

- 12. Lonely
- 14. Cries
- 31. Fear Do Bad
- 32. Perfect
- 33. Unloved
- 34. Out To Get
- 35. Worthless
- 45. Nervous
- 50. Fearful
- 52. Guilty
- 71. Self Consc
- 89. Suspicious
- 103. Sad
- 112. Worries
- TOTAL

## IV SOCIAL PROBLEMS

- 1. Acts Young
- 11. Clings
- 25. Not Get Along
- 38. Teased
- 48. Not Liked
- 55. Over-Weight
- 62. Clumsy
- 64. Prefers Young
- TOTAL

## V THOUGHT PROBLEMS

- 9. Mind Off
- 40. Hears Things
- 66. Repeats Acts
- 70. Sees Things
- 80. Stares
- 84. Strange Behav
- 85. Strange Ideas
- TOTAL

## VI ATTENTION PROBLEMS

- 1. Acts Young
- 8. Concentrate
- 10. Sit Still
- 13. Confuse
- 17. Day-dream
- 41. Impulsiv
- 46. Nervous
- 61. Poor School
- 62. Clumsy
- 80. Stares
- TOTAL

## VII DELINQUENT BEHAVIOR

- 26. No Guilt
- 39. Bad Compan
- 43. Lie Cheat
- 63. Prefers Older
- 67. Run Away
- 72. Set Fires
- 81. Steal Home
- 82. Steal Out
- 90. Swears
- 96. Think Sex
- 101. Truant
- 105. Alcohol Drugs
- 106. Vandal
- TOTAL

## VIII AGGRESSIVE BEHAVIOR

- 3. Argues
- 7. Brags
- 16. Mean
- 19. Dem Attn
- 20. Dest Own
- 21. Dest Othr
- 22. Disb Home
- 23. Disb Schl
- 27. Jealous
- 32. Sleep Walk
- 37. Fights
- 57. Attacks
- 68. Screams
- 74. Show Off
- 86. Stubborn
- 87. Mood Change
- 93. Talk Much
- 94. Teases
- 95. Temper
- 97. Threaten
- 104. Loud
- TOTAL

\* Not on cross-informant construct

IX Sex Problems (Age 4-11) Total S \_\_\_\_ T \_\_\_\_

INT = Scale I + II + III - Item 103 = \_\_\_\_ ; EXT = Scale VII + VIII = \_\_\_\_

Not scored on total problems: \_\_\_\_ 2. Allergy; \_\_\_\_ 4. Asthma

Broken lines = borderline clinical range

Internalizing	Externalizing	Total Score	T	ID #
62	62	100	66	100
60-61	60-61	99	65	99
59	59	98	64	98
57-58	57	97	63	97
56	56-57	96	62	96
54-55	55	95	61	95
52-53	54	94	60	94
51	52-53	93	59	93
49-50	51	92	58	92
48	50	91	57	91
46-47	48-49	90	56	90
45	47	89	55	89
43-44	45-46	88	54-55	88
42	44	87	53	87
40-41	43	86	50-51	86
39	41-42	85	49	85
37-38	40	84	47-48	84
36	38-39	83	46	83
34-35	37	82	44-45	82
33	35-36	81	43	81
31-32	34	80	41-42	80
30	33	79	40	79
29	31-32	78	39	78
27-28	30	77	37-38	77
26	28-29	76	36	76
24-25	27	75	34-35	75
23	25-26	74	33	74
21-22	24	73	31-32	73
20	23	72	30	72
18-19	21-22	71	28-29	71
17	20	70	27	70
16	19	69	26	69
15	18	68	24-25	68
14	17	67	23	67
13	16	66	22	66
12	15	65	21	65
11	14	64	20	64
10	13	63	19	63
9	12	62	18	62
8	11	61	17	61
7	10	60	16	60
6	9	59	15	59
5	8	58	14	58
4	7	57	13	57
3	6	56	12	56
2	5	55	11	55
1	4	54	10	54
0	3	53	9	53
0	2	52	8	52
0	1	51	7	51
0	0	50	6	50
0	0	49	5	49
0	0	48	4	48
0	0	47	3	47
0	0	46	2	46
0	0	45	1	45
0	0	44	0	44
0	0	43	0	43
0	0	42	0	42
0	0	41	0	41
0	0	40	0	40
0	0	39	0	39
0	0	38	0	38
0	0	37	0	37
0	0	36	0	36
0	0	35	0	35
0	0	34	0	34
0	0	33	0	33
0	0	32	0	32
0	0	31	0	31
0	0	30	0	30
0	0	29	0	29
0	0	28	0	28
0	0	27	0	27
0	0	26	0	26
0	0	25	0	25
0	0	24	0	24
0	0	23	0	23
0	0	22	0	22
0	0	21	0	21
0	0	20	0	20
0	0	19	0	19
0	0	18	0	18
0	0	17	0	17
0	0	16	0	16
0	0	15	0	15
0	0	14	0	14
0	0	13	0	13
0	0	12	0	12
0	0	11	0	11
0	0	10	0	10
0	0	9	0	9
0	0	8	0	8
0	0	7	0	7
0	0	6	0	6
0	0	5	0	5
0	0	4	0	4
0	0	3	0	3
0	0	2	0	2
0	0	1	0	1
0	0	0	0	0





